

INSTALLATION

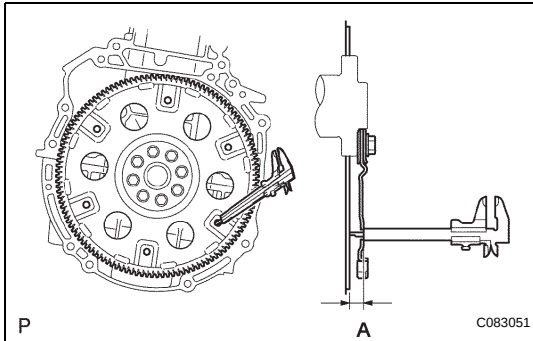
1. INSPECT TORQUE CONVERTER CLUTCH ASSEMBLY

HINT:

(See page [AX-248](#))

2. INSTALL TORQUE CONVERTER CLUTCH ASSEMBLY

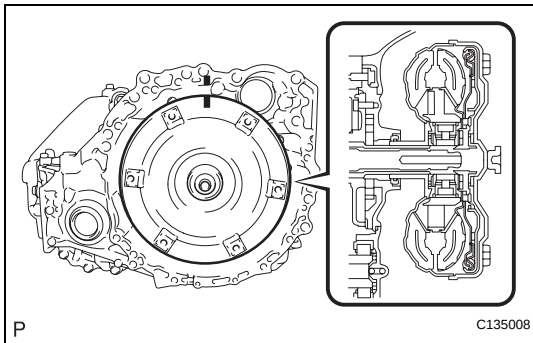
- (a) Using vernier calipers and a straightedge, measure dimension "A" between the transaxle fitting part of the engine and the converter fitting part of the drive plate (*1).



- (b) Aligning the matchmarks on the transaxle case and torque converter clutch assembly, engage the splines of the input shaft and turbine runner.

NOTICE:

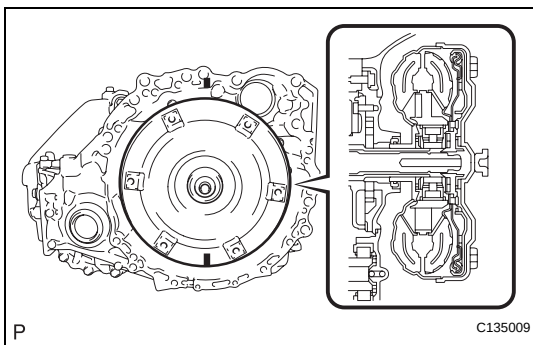
Do not push on the torque converter when aligning the matchmarks.



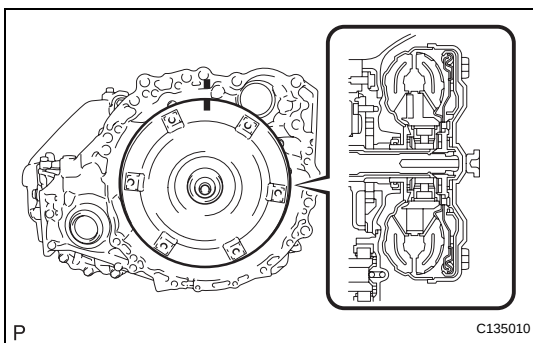
- (c) Engage the splines of the stator shaft and the stator while turning the torque converter clutch assembly.

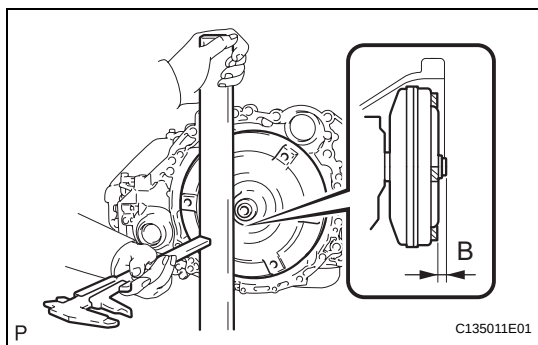
HINT:

Turn the torque converter clutch assembly approximately 180°.



- (d) Turn the torque converter clutch assembly and align the matchmarks on the torque converter clutch assembly and transaxle case to engage the key of the oil pump drive gear into the slot on the torque converter clutch assembly.





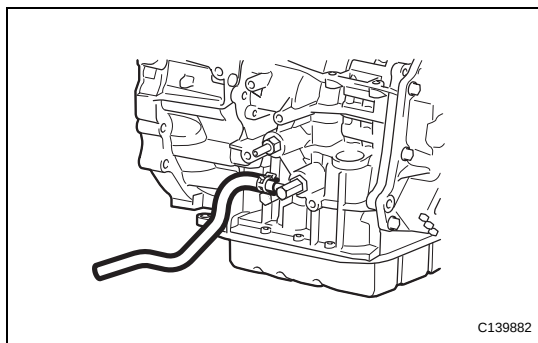
- (e) Using vernier calipers and a straightedge, measure dimension "B" shown in the illustration and check that "B" is greater than "A" (measured in step (*1)).

Standard:

A + 1 mm (0.04 in.) or more

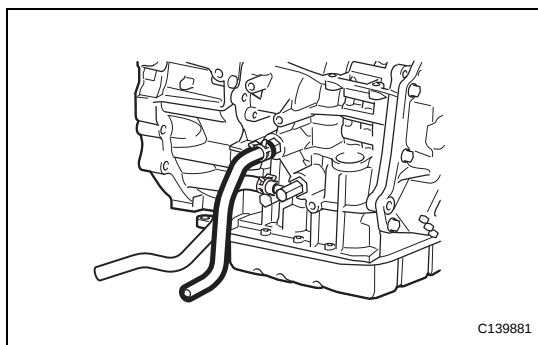
NOTICE:

Make sure to deduct the thickness of the straightedge.



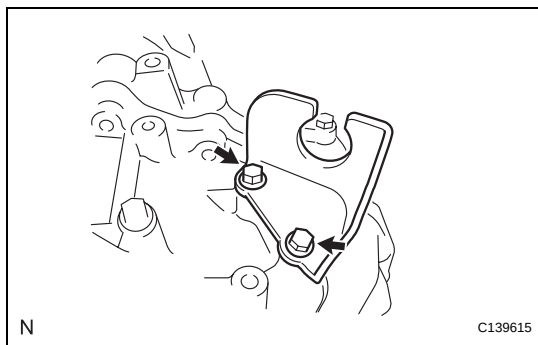
3. INSTALL NO. 1 OIL COOLER INLET HOSE

- (a) Install the No. 1 oil cooler inlet hose.



4. INSTALL NO. 1 OIL COOLER OUTLET HOSE

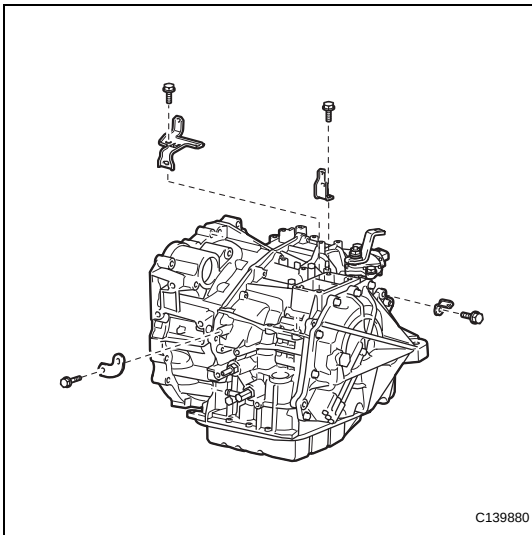
- (a) Install the No. 1 oil cooler outlet hose.



5. INSTALL NO. 1 TRANSMISSION CONTROL CABLE BRACKET

- (a) Install the No. 1 transmission control cable bracket with the 2 bolts.

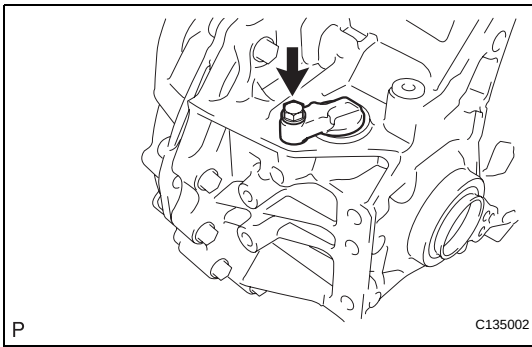
Torque: 12 N*m (122 kgf*cm, 9 ft.*lbf)

**6. INSTALL WIRE HARNESS CLAMP BRACKET**

- (a) Install the 4 clamp brackets and 4 bolts.
Torque: 8.4 N*m (86 kgf*cm, 74 in.*lbf)

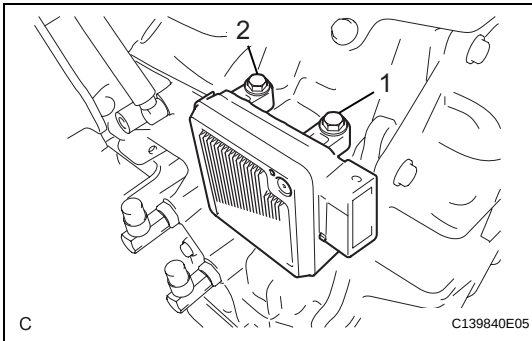
7. INSTALL SPEEDOMETER DRIVEN HOLE COVER SUB-ASSEMBLY

- (a) Coat a new O-ring with ATF, and install it to the hole cover.



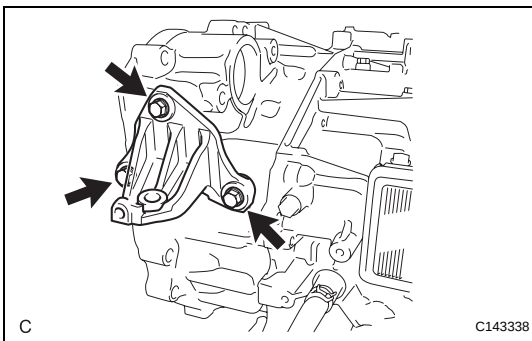
- (b) Install the hole cover to the transaxle case with the bolt.

Torque: 5.5 N*m (56 kgf*cm, 49 in.*lbf)

**8. INSTALL TCM**

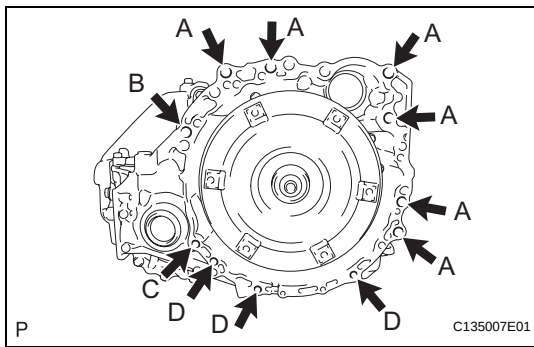
- (a) Install the TCM to the transaxle.
(b) Install and tighten the 2 bolts in the order shown in the illustration.

Torque: 11 N*m (115 kgf*cm, 8 ft.*lbf)

**9. INSTALL ENGINE MOUNTING FRONT BRACKET**

- (a) Install the engine mounting front bracket to the automatic transaxle with the 3 bolts.

Torque: 64 N*m (653 kgf*cm, 47 ft.*lbf)



10. INSTALL AUTOMATIC TRANSAXLE ASSEMBLY

- (a) Install the automatic transaxle to the engine with the 11 bolts.

Torque: Bolt A

64 N*m (653 kgf*cm, 47 ft.*lbf)

Bolt B

64 N*m (653 kgf*cm, 47 ft.*lbf)

Bolt C

46 N*m (469 kgf*cm, 34 ft.*lbf)

Bolt D

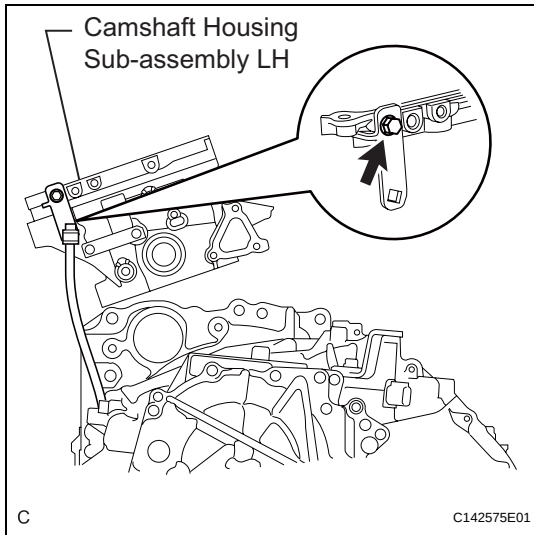
43 N*m (439 kgf*cm, 32 ft.*lbf)

- (b) Install the breather bracket to the camshaft housing sub-assembly LH with the bolt.

Torque: 5.5 N*m (56 kgf*cm, 49 in.*lbf)

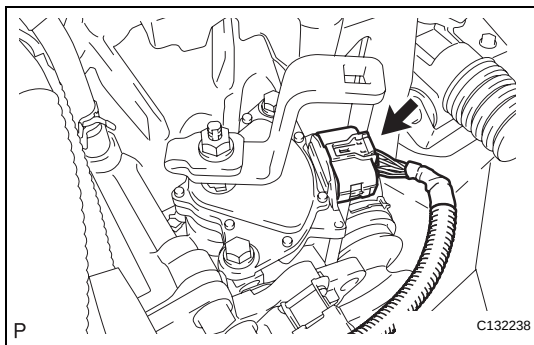
- (c) Install the breather hose to the breather bracket.

11. INSTALL STARTER ASSEMBLY (See page [ST-152](#))



12. CONNECT CONNECTOR

- (a) Connect the park/neutral position switch connector.



13. INSTALL WIRE HARNESS

- (a) Connect the wire harness with the bolt.

Torque: 12 N*m (122 kgf*cm, 9 ft.*lbf)

14. INSTALL ENGINE WIRE

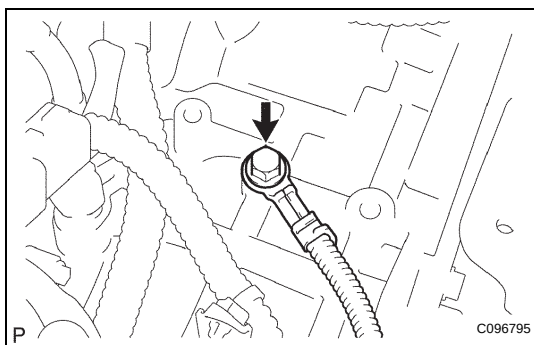
15. INSTALL FRONT DRIVE SHAFT ASSEMBLY LH (See page [DS-16](#))

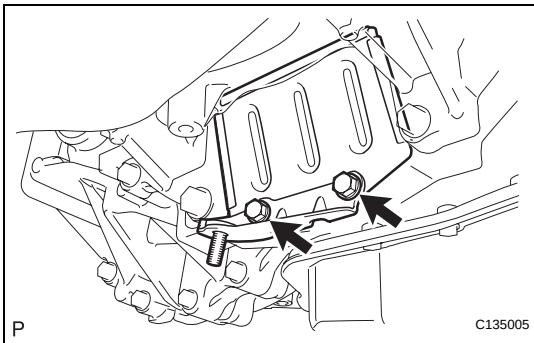
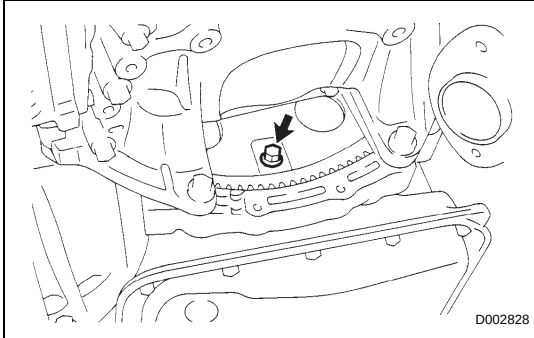
16. INSTALL FRONT DRIVE SHAFT ASSEMBLY RH (See page [DS-16](#))

17. INSTALL FRONT FRAME ASSEMBLY (See page [EM-42](#))

18. INSTALL VANE PUMP ASSEMBLY (See page [EM-42](#))

19. INSTALL ENGINE ASSEMBLY WITH TRANSAXLE (See page [EM-43](#))





20. INSTALL COOLER COMPRESSOR ASSEMBLY (See page [EM-43](#))
21. INSTALL GENERATOR ASSEMBLY (See page [CH-22](#))
22. INSTALL STEERING INTERMEDIATE SHAFT ASSEMBLY (See page [PS-53](#))
23. INSTALL DRIVE PLATE AND TORQUE CONVERTER CLUTCH SETTING BOLT
 - (a) Apply a few drops of adhesive to 2 threads on the tip of the 6 torque converter clutch mounting bolts.
Adhesive:
Toyota Genuine Adhesive 1324, Three Bond 1324 or equivalent
 - (b) Install the 6 torque converter clutch mounting bolts.
Torque: 41 N*m (418 kgf*cm, 30 ft.*lbf)
NOTICE:
First install the black colored bolt, and then the remaining 5 bolts.
 - (c) Install the flywheel housing under cover to the automatic transaxle with the 2 bolts.
Torque: 7.8 N*m (80 kgf*cm, 69 in.*lbf)
24. INSTALL NO. 1 EXHAUST PIPE SUPPORT BRACKET (See page [EM-43](#))
25. INSTALL FRONT AXLE ASSEMBLY LH (See page [DS-16](#))
26. INSTALL FRONT AXLE ASSEMBLY RH
HINT:
Use the same procedures described for the LH side.
27. INSTALL FRONT SUSPENSION LOWER NO. 1 ARM LH (See page [DS-16](#))
28. INSTALL FRONT SUSPENSION LOWER NO. 1 ARM RH
HINT:
Use the same procedures described for the LH side.
29. INSTALL TIE ROD ASSEMBLY LH (See page [DS-16](#))
30. INSTALL TIE ROD ASSEMBLY RH
HINT:
Use the same procedures described for the LH side.
31. INSTALL FRONT SPEED SENSOR LH (See page [DS-17](#))
32. INSTALL FRONT SPEED SENSOR RH
HINT:
Use the same procedures described for the LH side.
33. INSTALL FRONT STABILIZER LINK ASSEMBLY LH (See page [DS-17](#))
34. INSTALL FRONT STABILIZER LINK ASSEMBLY RH
HINT:
Use the same procedures described for the LH side.

35. INSTALL FRONT AXLE HUB NUT LH (See page [DS-17](#))
36. INSTALL FRONT AXLE HUB NUT RH
HINT:
Use the same procedures described for the LH side.
37. INSTALL EXHAUST PIPE ASSEMBLY FRONT (See page [EX-4](#))
38. INSTALL EXHAUST PIPE NO. 1 SUPPORT BRACKET (See page [EX-4](#))
39. CONNECT OIL RESERVOIR TO PUMP HOSE (See page [EM-44](#))
40. CONNECT RETURN TUBE SUB-ASSEMBLY (See page [EM-44](#))
41. CONNECT FUEL TUBE SUB-ASSEMBLY (See page [EM-44](#))
42. CONNECT TRANSMISSION CONTROL CABLE ASSEMBLY (See page [EM-45](#))
43. CONNECT ENGINE WIRE (See page [EM-45](#))
44. INSTALL RELAY BLOCK COVER UPPER
45. INSTALL ECM
(See page [ES-544](#))
46. CONNECT HEATER INLET WATER HOSE (See page [EM-46](#))
47. CONNECT HEATER OUTLET WATER HOSE (See page [EM-46](#))
48. CONNECT NO. 1 OIL COOLER INLET HOSE (See page [EM-46](#))
49. CONNECT NO. 1 OIL COOLER OUTLET HOSE (See page [EM-46](#))
50. INSTALL RADIATOR HOSE INLET (See page [EM-46](#))
51. INSTALL RADIATOR HOSE OUTLET (See page [EM-46](#))
52. CONNECT CHECK VALVE TO BRAKE BOOSTER HOSE (See page [EM-46](#))
53. CONNECT NO. 1 FUEL VAPOR FEED HOSE (See page [EM-47](#))
54. INSTALL ENGINE MOVING CONTROL ROD SUB-ASSEMBLY (See page [EM-47](#))
55. INSTALL NO. 2 ENGINE MOUNTING STAY RH (See page [EM-47](#))
56. INSTALL INTAKE AIR RESONATOR SUB-ASSEMBLY (See page [EM-47](#))
57. INSTALL BATTERY (See page [EM-47](#))

58. INSTALL NO. 1 AIR CLEANER INLET (See page [EM-48](#))
59. INSTALL AIR CLEANER CASE SUB-ASSEMBLY (See page [EM-48](#))
60. INSTALL AIR CLEANER CAP SUB-ASSEMBLY (See page [ES-522](#))
61. INSTALL AIR CLEANER INLET ASSEMBLY (See page [EM-48](#))
62. CONNECT VACUUM HOSES (See page [EM-49](#))
63. INSTALL V-RIBBED BELT (See page [EM-7](#))
64. INSTALL FRONT WHEELS (See page [EM-49](#))
65. ADD ENGINE OIL
66. CONNECT CABLE TO NEGATIVE BATTERY TERMINAL (See page [EM-49](#))
67. ADD ENGINE COOLANT (See page [CO-6](#))
68. ADD AUTOMATIC TRANSAXLE FLUID
HINT:
(See page [AX-176](#))
69. ADD POWER STEERING FLUID
70. BLEED POWER STEERING FLUID (See page [PS-8](#))
71. CHECK FOR FUEL LEAKS (See page [FU-7](#))
72. CHECK FOR ENGINE OIL LEAKS
73. CHECK FOR ENGINE COOLANT LEAKS (See page [CO-1](#))
74. CHECK FOR EXHAUST GAS LEAKS
75. CHECK SHIFT LEVER POSITION (See page [AX-232](#))
76. CHECK AND ADJUST FRONT WHEEL ALIGNMENT
HINT:
(See page [SP-4](#))
77. CHECK IGNITION TIMING (See page [EM-1](#))
78. CHECK ENGINE IDLE SPEED (See page [EM-2](#))
79. CHECK CO/HC (See page [EM-4](#))
80. CHECK FUNCTION OF THROTTLE BODY (See page [ES-519](#))
81. INSTALL FRONT FENDER APRON SEAL RH
82. INSTALL ENGINE UNDER COVER LH
83. INSTALL ENGINE UNDER COVER RH
84. INSTALL V-BANK COVER SUB-ASSEMBLY (See page [EM-49](#))
85. INSTALL ENGINE ROOM SIDE COVER LH (See page [EM-50](#))

86. **INSTALL ENGINE ROOM SIDE COVER RH** (See page [EM-50](#))
87. **INSTALL COOL AIR INTAKE DUCT SEAL** (See page [EM-50](#))
88. **CHECK ABS SPEED SENSOR SIGNAL**
HINT:
(See page [BC-24](#))
89. **PERFORM TCM REGISTRATION**
HINT:
(See page [AX-18](#))
90. **PERFORM INITIALIZATION**
 - (a) Perform initialization procedure (See page [IN-33](#)).
NOTICE:
Some systems need initialization after reconnecting the cable to the negative battery terminal.